

# Magnetic and Optical Recording Media Manufacturing: 2002

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## 2002 Economic Census

*Manufacturing*

Industry Series



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U.S. Department of Commerce  
Economics and Statistics Administration  
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-- Not applicable for this report.

**Table 1. Historical Statistics for the Industry: 2002 and Earlier Years**

[Data based on the 2002 Economic Census and the 2002 Annual Survey of Manufactures (ASM). For information on confidentiality protection, sampling error, nonsampling error, and explanation of terms, see note at end of table. For meaning of abbreviations and symbols, see introductory text]

Industry and year <sup>1</sup>	Com- panies <sup>2</sup>	All estab- lish- ments <sup>3</sup>	All employees		Production workers			Value added (\$1,000)	Total cost of materials (\$1,000)	Total value of shipments (\$1,000)	Total capital expendi- tures (\$1,000)
			Number <sup>4</sup>	Payroll (\$1,000)	Number <sup>4</sup>	Hours (1,000)	Wages (\$1,000)				
334613, Magnetic and optical recording media manufacturing .....	2002.. 169	173	5 754	250 614	3 993	8 548	149 104	1 240 214	947 538	2 218 973	'83 169
	2001.. N	N	11 283	512 715	6 759	14 643	249 306	1 126 676	1 386 538	2 475 061	140 020
	2000.. N	N	15 030	611 525	9 639	18 967	303 356	1 440 626	1 947 624	3 401 568	261 264
	1999.. N	N	17 217	681 352	11 414	23 891	356 197	1 902 526	1 818 858	3 763 597	304 135
	1998.. N	N	19 184	715 867	12 756	27 143	394 176	2 242 263	2 117 772	4 358 594	311 435
	1997.. 241	257	20 869	803 274	14 337	29 384	408 755	2 300 229	2 408 526	4 678 766	439 882

<sup>1</sup>Statistics presented for years ending in 2 and 7 are census data. Interim census years are derived in a representative sample of manufacturing establishments canvassed in the Annual Survey of Manufactures (ASM).

<sup>2</sup>For the census, a company is defined as a business organization consisting of one establishment or more under common ownership or control.

<sup>3</sup>Includes establishments with payroll at any time during the year.

<sup>4</sup>Number of employees figures represent average number of production workers for pay period that includes the 12th of March, May, August, and November plus other employees for payroll period that includes the 12th of March.

Note: The data in this table are based on the 2002 Economic Census and the 2002 Annual Survey of Manufactures (ASM). To maintain confidentiality, the Census Bureau suppresses data to protect the identity of any business or individual. The census results in this table contain sampling errors and nonsampling errors. Data users who create their own estimates using data from American FactFinder tables should cite the Census Bureau as the source of the original data only. For explanation of terms, see Appendix A. For full technical documentation, see Appendix C.

**Table 2. Industry Statistics for Selected States: 2002**

[States that are a disclosure or with less than 100 employees are not shown. Data based on the 2002 Economic Census. For information on confidentiality protection, nonsampling error, explanation of terms, and geographical definitions, see note at end of table. For information on geographic areas followed by \*, see Appendix D. For meaning of abbreviations and symbols, see introductory text]

Industry and geographic area	E <sup>1</sup>	All establishments <sup>2</sup>		All employees		Production workers			Value added (\$1,000)	Total cost of materials (\$1,000)	Total value of shipments (\$1,000)	Total capital expenditures (\$1,000)
		Total	With 20 employees or more	Number <sup>3</sup>	Payroll (\$1,000)	Number <sup>3</sup>	Hours (1,000)	Wages (\$1,000)				
<b>334613, Magnetic and optical recording media manufacturing</b>												
United States .....	—	173	35	5 754	250 614	3 993	8 548	149 104	1 240 214	947 538	2 218 973	'83 169
California .....	—	59	10	2 548	113 241	1 717	3 622	62 350	549 674	360 426	927 910	'38 623
Massachusetts .....	—	5	2	250	12 445	207	419	9 697	32 152	80 985	113 767	'1 716
New York .....	2	15	5	414	17 046	269	499	10 344	56 208	46 713	102 971	'3 421

<sup>1</sup>Some payroll and sales data for small single-establishment companies with up to 20 employees (cutoff varied by industry) were obtained from administrative records of other government agencies rather than from census report forms. These data were then used in conjunction with industry averages to estimate statistics for these small establishments. This technique was also used for a small number of other establishments whose reports were not received at the time data were tabulated. The following symbols are shown where estimated data account for 10 percent or more of the figures shown: 1—10 to 19 percent; 2—20 to 29 percent; 3—30 to 39 percent; 4—40 to 49 percent; 5—50 to 59 percent; 6—60 to 69 percent; 7—70 to 79 percent; 8—80 to 89 percent; 9—90 percent or more.

<sup>2</sup>Includes establishments with payroll at any time during the year.

<sup>3</sup>Number of employees figures represent average number of production workers for pay period that includes the 12th of March, May, August, and November plus other employees for payroll period that includes the 12th of March.

Note: The data in this table are based on the 2002 Economic Census. To maintain confidentiality, the Census Bureau suppresses data to protect the identity of any business or individual. The census results in this table contain nonsampling errors. Data users who create their own estimates using data from American FactFinder tables should cite the Census Bureau as the source of the original data only. For explanation of terms, see Appendix A. For full technical documentation, see Appendix C. For geographical definitions, see Appendix D.

# Table 3. Detailed Statistics by Industry: 2002

[Data based on the 2002 Economic Census and the 2002 Annual Survey of Manufactures (ASM). For information on confidentiality protection, sampling error, nonsampling error, and explanation of terms, see note 2 at end of table. For meaning of abbreviations and symbols, see introductory text]

Item	Value
<b>334613, Magnetic and optical recording media manufacturing</b>	
Companies <sup>1</sup> .....	number.. 169
All establishments <sup>2</sup> .....	number.. 173
Establishments with 1 to 19 employees .....	number.. 138
Establishments with 20 to 99 employees .....	number.. 23
Establishments with 100 employees or more .....	number.. 12
All employees <sup>3</sup> .....	number.. 5 754
Total compensation .....	\$1,000.. 319 184
Annual payroll .....	\$1,000.. 250 614
Total fringe benefits .....	\$1,000.. 68 570
Production workers, average for year .....	number.. 3 993
Production workers on March 12 .....	number.. 4 024
Production workers on May 12 .....	number.. 4 005
Production workers on August 12 .....	number.. 4 021
Production workers on November 12 .....	number.. 3 919
Production worker hours .....	1,000.. 8 548
Production worker wages .....	\$1,000.. 149 104
Total cost of materials .....	\$1,000.. 947 538
Materials, parts, containers, packaging, etc., used .....	\$1,000.. 883 401
Resales .....	\$1,000.. 29 889
Purchased fuels .....	\$1,000.. 6 967
Purchased electricity .....	\$1,000.. 18 365
Contract work .....	\$1,000.. 8 916
Quantity of electricity purchased for heat and power .....	1,000 kWh.. 292 074
Quantity of electricity generated less sold for heat and power .....	1,000 kWh.. D
Total value of shipments .....	\$1,000.. 2 218 973
Primary products value of shipments .....	\$1,000.. 2 106 593
Secondary products value of shipments .....	\$1,000.. 29 495
Total miscellaneous receipts .....	\$1,000.. 82 885
Value of resales .....	\$1,000.. 34 216
Contract receipts .....	\$1,000.. -
Other miscellaneous receipts .....	\$1,000.. 48 669
Primary products specialization ratio .....	percent.. 99
Value of primary products shipments made in all industries .....	\$1,000.. 2 520 035
Value of primary products shipments made in this industry .....	\$1,000.. 2 106 593
Value of primary products shipments made in other industries .....	\$1,000.. 413 442
Coverage ratio .....	percent.. 84
Value added .....	\$1,000.. 1 240 214
Total inventories, beginning of year .....	\$1,000.. 220 072
Finished goods inventories .....	\$1,000.. 54 888
Work-in-process inventories .....	\$1,000.. 41 593
Materials and supplies inventories .....	\$1,000.. 123 591
Total inventories, end of year .....	\$1,000.. 169 737
Finished goods inventories .....	\$1,000.. 28 025
Work-in-process inventories .....	\$1,000.. 37 235
Materials and supplies inventories .....	\$1,000.. 104 477
Gross value of depreciable assets (acquisition costs) at beginning of year .....	\$1,000.. 1 303 276
Total capital expenditures (new and used) .....	\$1,000.. '83 169
Buildings and other structures (new and used) .....	\$1,000.. '17 510
Machinery and equipment (new and used) .....	\$1,000.. '65 659
Automobiles, trucks, etc., for highway use .....	\$1,000.. '640
Computers and peripheral data processing equipment .....	\$1,000.. '3 876
All other expenditures for machinery and equipment .....	\$1,000.. '61 143
Total retirements .....	\$1,000.. '83 058
Gross value of depreciable assets at end of year .....	\$1,000.. '1 303 387
Depreciation charges during year .....	\$1,000.. '60 733
Total rental payments .....	\$1,000.. 51 199
Buildings and other structures .....	\$1,000.. 10 818
Machinery and equipment .....	\$1,000.. 40 381
Total other expenses <sup>4</sup> .....	\$1,000.. 119 721
Response coverage ratio <sup>5</sup> .....	percent.. 95
Repair and maintenance services of buildings and/or machinery <sup>4</sup> .....	\$1,000.. 17 408
Communications services <sup>4</sup> .....	\$1,000.. 1 928
Legal services <sup>4</sup> .....	\$1,000.. D
Accounting, auditing, and bookkeeping services <sup>4</sup> .....	\$1,000.. D
Advertising and promotional services <sup>4</sup> .....	\$1,000.. D
Expensed computer hardware and supplies and purchased computer services <sup>4</sup> .....	\$1,000.. 3 837
Refuse removal (including hazardous waste) services <sup>4</sup> .....	\$1,000.. 1 552
Management consulting and administrative services <sup>4</sup> .....	\$1,000.. 7 062
Taxes and license fees <sup>4</sup> .....	\$1,000.. 3 502
All other expenses <sup>4</sup> .....	\$1,000.. 76 236

<sup>1</sup>For the census, a company is defined as a business organization consisting of one establishment or more under common ownership or control.

<sup>2</sup>Includes establishments with payroll at any time during the year.

<sup>3</sup>Number of employees figures represent average number of production workers for pay period that includes the 12th of March, May, August, and November plus other employees for payroll period that includes the 12th of March.

<sup>4</sup>Based on 2002 Annual Survey of Manufactures (ASM) sample data.

<sup>5</sup>A response coverage ratio is derived for this item by calculating the ratio of the weighted employment (establishment data multiplied by sample weight) for those Annual Survey of Manufactures (ASM) establishments that reported to the weighted total employment for all ASM establishments classified in this industry.

Note 1: The amounts shown for other expenses reflect only those services that establishments purchase from other companies.

Note 2: The data in this table are based on the 2002 Economic Census and the 2002 Annual Survey of Manufactures (ASM). To maintain confidentiality, the Census Bureau suppresses data to protect the identity of any business or individual. The census results in this table contain sampling errors and nonsampling errors. Data users who create their own estimates using data from American FactFinder tables should cite the Census Bureau as the source of the original data only. For explanation of terms, see Appendix A. For full technical documentation, see Appendix C.

**Table 4. Industry Statistics by Employment Size: 2002**

[Data based on the 2002 Economic Census. For information on confidentiality protection, nonsampling error, and explanation of terms, see note at end of table. For meaning of abbreviations and symbols, see introductory text]

Employment size class	E <sup>1</sup>	All establishments <sup>2</sup>	All employees		Production workers			Value added (\$1,000)	Total cost of materials (\$1,000)	Total value of shipments (\$1,000)	Total capital expenditures (\$1,000)
			Number <sup>3</sup>	Payroll (\$1,000)	Number <sup>3</sup>	Hours (1,000)	Wages (\$1,000)				
334613, Magnetic and optical recording media manufacturing											
All establishments .....	—	173	5 754	250 614	3 993	8 548	149 104	1 240 214	947 538	2 218 973	'83 169
Establishments with—											
1 to 4 employees .....	9	94	204	7 725	133	234	4 456	17 033	22 586	39 592	'964
5 to 9 employees .....	9	19	127	5 541	87	191	3 437	12 697	18 878	31 579	'811
10 to 19 employees .....	8	25	364	15 199	249	524	9 188	35 825	49 226	86 296	'2 155
20 to 49 employees .....	2	13	388	16 794	266	531	9 260	44 619	47 591	96 311	'6 453
50 to 99 employees .....	—	10	692	33 628	377	769	14 794	135 164	108 927	250 511	'4 829
100 to 249 employees .....	—	6	876	36 396	694	1 401	26 830	185 696	275 301	461 965	'12 910
250 to 499 employees .....	—	4	g	D	D	D	D	D	D	D	D
500 to 999 employees .....	—	1	f	D	D	D	D	D	D	D	D
1,000 to 2,499 employees .....	—	1	g	D	D	D	D	D	D	D	D
2,500 employees or more .....	—	—	—	—	—	—	—	—	—	—	—
Administrative records <sup>4</sup> .....	9	121	537	22 894	361	737	13 680	51 665	75 061	126 720	'3 221

<sup>1</sup>Some payroll and sales data for small single-establishment companies with up to 20 employees (cutoff varied by industry) were obtained from administrative records of other government agencies rather than from census report forms. These data were then used in conjunction with industry averages to estimate statistics for these small establishments. This technique was also used for a small number of other establishments whose reports were not received at the time data were tabulated. The following symbols are shown where estimated data account for 10 percent or more of the figures shown: 1—10 to 19 percent; 2—20 to 29 percent; 3—30 to 39 percent; 4—40 to 49 percent; 5—50 to 59 percent; 6—60 to 69 percent; 7—70 to 79 percent; 8—80 to 89 percent; 9—90 percent or more.

<sup>2</sup>Includes establishments with payroll at any time during the year.

<sup>3</sup>Number of employees figures represent average number of production workers for pay period that includes the 12th of March, May, August, and November plus other employees for payroll period that includes the 12th of March.

<sup>4</sup>Some payroll and sales data for small single-establishment companies with up to 20 employees (cutoff varied by industry) were obtained from administrative records of other government agencies rather than from census report forms. These data were then used in conjunction with industry averages to estimate statistics for these small establishments. Data are also included in respective size classes shown.

Note: The data in this table are based on the 2002 Economic Census. To maintain confidentiality, the Census Bureau suppresses data to protect the identity of any business or individual. The census results in this table contain nonsampling errors. Data users who create their own estimates using data from American FactFinder tables should cite the Census Bureau as the source of the original data only. For explanation of terms, see Appendix A. For full technical documentation, see Appendix C.

**Table 5. Industry Statistics by Primary Product Class Specialization: 2002**

[Data based on the 2002 Economic Census. For information on confidentiality protection, nonsampling error, and explanation of terms, see note at end of table. For meaning of abbreviations and symbols, see introductory text]

Industry or product class code	Industry or primary product class	All establishments <sup>1</sup>	All employees		Production workers			Value added (\$1,000)	Total cost of materials (\$1,000)	Total value of shipments (\$1,000)	Total capital expenditures (\$1,000)
			Number <sup>2</sup>	Payroll (\$1,000)	Number <sup>2</sup>	Hours (1,000)	Wages (\$1,000)				
334613	Magnetic and optical recording media manufacturing .....	173	5 754	250 614	3 993	8 548	149 104	1 240 214	947 538	2 218 973	'83 169
3346130	Magnetic and optical recording media .....	173	5 754	250 614	3 993	8 548	149 104	1 240 214	947 538	2 218 973	'83 169

<sup>1</sup>Includes establishments with payroll at any time during the year.

<sup>2</sup>Number of employees figures represent average number of production workers for pay period that includes the 12th of March, May, August, and November plus other employees for payroll period that includes the 12th of March.

Note: The data in this table are based on the 2002 Economic Census. To maintain confidentiality, the Census Bureau suppresses data to protect the identity of any business or individual. The census results in this table contain nonsampling errors. Data users who create their own estimates using data from American FactFinder tables should cite the Census Bureau as the source of the original data only. For explanation of terms, see Appendix A. For full technical documentation, see Appendix C.

Table 6a. **Products Statistics: 2002 and 1997**

[Includes quantity and value of products of this industry produced by (1) establishments classified in this industry (primary) and (2) establishments classified in other industries (secondary). Transfers of products of this industry from one establishment of a company to another establishment of the same company (interplant transfers) are also included. Data based on the 2002 Economic Census. For information on confidentiality protection, nonsampling error, and explanation of terms, see note 2 at end of table. For meaning of abbreviations and symbols, see introductory text]

Product code	Product	Number of companies with shipments of \$100,000 or more	Quantity of production for all purposes	Product shipments	
				Quantity	Value (\$1,000)
334613	Magnetic and optical recording media manufacturing .....	2002.. N	X	X	2 520 035
	1997.. N		X	X	5 913 679
3346130	Magnetic and optical recording media .....	2002.. N	X	X	2 520 035
	1997.. N		X	X	5 913 679
33461301	Magnetic and optical recording media, unrecorded disks .....	2002.. N	X	X	174 671
	1997.. N		X	X	1 360 492
3346130110	Magnetic and optical recording media, unrecorded disks <sup>1</sup> .....	2002.. 16	X	X	174 671
	1997.. 23		X	X	1 360 492
33461304	Magnetic and optical recording media, unrecorded tapes, including reels, cassettes, cartridges, and video .....	2002.. N	X	X	1 606 946
	1997.. N		X	X	2 444 423
3346130410	Magnetic and optical recording media, unrecorded tapes, including reels, cassettes, cartridges, and video <sup>1</sup> .....	2002.. 23	X	X	1 606 946
	1997.. 24		X	X	2 444 423
33461306	All other magnetic and optical recording media, unrecorded .....	2002.. N	X	X	542 404
	1997.. N		X	X	1 493 689
3346130610	All other magnetic and optical recording media, unrecorded <sup>1</sup> .....	2002.. 34	X	X	542 404
	1997.. 17		X	X	1 493 689
3346130Y	Magnetic and optical recording media, nsk, total .....	2002.. N	X	X	196 014
	1997.. N		X	X	615 075
3346130YWW	Magnetic and optical recording media, nsk, for nonadministrative-record establishments .....	2002.. N	X	X	82 041
	1997.. N		X	X	463 645
3346130YWY	Magnetic and optical recording media, nsk, for administrative-record establishments .....	2002.. N	X	X	113 973
	1997.. N		X	X	151 430

<sup>1</sup>For additional detail, see Current Industrial Report MA334R, Computers and Office and Accounting Machines.

Note 1: For some establishments, data have been estimated from central unit values that are based on quantity-value relationships of reported data. The following symbols are used when percentage of each quantity figure estimated in this manner equals or exceeds 10 percent of published figure: p-10 to 19 percent estimated; q-20 to 29 percent estimated. If 30 percent or more is estimated, figure is replaced by S.

Note 2: The data in this table are based on the 2002 Economic Census. To maintain confidentiality, the Census Bureau suppresses data to protect the identity of any business or individual. The census results in this table contain nonsampling errors. Data users who create their own estimates using data from American FactFinder tables should cite the Census Bureau as the source of the original data only. For explanation of terms, see Appendix A. For full technical documentation, see Appendix C.



Table 6b. **Product Class Shipments for Selected States: 2002 and 1997**

[Not applicable for this report.]

**Table 7. Materials Consumed by Kind: 2002 and 1997**

[Includes quantity and cost of materials consumed or put into production by establishments classified only in this industry. Data based on the 2002 Economic Census. For information on confidentiality protection, nonsampling error, and explanation of terms, see note 2 at end of table. For meaning of abbreviations and symbols, see introductory text]

Material code	Material consumed	Quantity	Delivered cost (\$1,000)
334613	Magnetic and optical recording media manufacturing		
00900001	Total materials .....2002..	X	883 401
	.....1997..	X	2 159 479
32221001	Paperboard containers, boxes, and corrugated paperboard .....2002..	X	8 747
	.....1997..	X	76 032
32521105	Plastics resins consumed in the form of granules, pellets, powders, liquids, etc. ....2002..	X	26 598
	.....1997..	X	75 374
32610007	Fabricated plastics products (excluding gaskets, hoses, and belting) .....2002..	X	9 741
	.....1997..	X	103 808
32610013	Plastics products consumed in the form of sheets, rods, tubes, film, and other shapes .....2002..	X	133 939
	.....1997..	X	329 340
33272203	Metal bolts, nuts, screws, washers, rivets, and other screw machine products .....2002..	X	D
	.....1997..	X	D
33200095	Other fabricated metal products (excluding castings and forgings) .....2002..	X	D
	.....1997..	X	D
33100038	Aluminum and aluminum-base alloy shapes and forms (excluding castings, forgings, and fabricated metal products) .....2002..	X	D
	.....1997..	X	N
33100077	Other nonferrous shapes and forms (excluding castings, forgings, and fabricated metal products) .....2002..	X	D
	.....1997..	X	D
33111107	Ferrites (powder and paste) .....2002..	X	D
	.....1997..	X	D
00970099	All other materials and components, parts, containers, and supplies .....2002..	X	566 001
	.....1997..	X	655 774
00971000	Materials, ingredients, containers, and supplies, nsk .....2002..	X	77 562
	.....1997..	X	689 837

Note 1: For some establishments, data have been estimated from central unit values that are based on quantity-value relationships of reported data. The following symbols are used when percentage of each quantity figure estimated in this manner equals or exceeds 10 percent of published figure: p-10 to 19 percent estimated; q-20 to 29 percent estimated. If 30 percent or more is estimated, figure is replaced by S.

Note 2: The data in this table are based on the 2002 Economic Census. To maintain confidentiality, the Census Bureau suppresses data to protect the identity of any business or individual. The census results in this table contain nonsampling errors. Data users who create their own estimates using data from American FactFinder tables should cite the Census Bureau as the source of the original data only. For explanation of terms, see Appendix A. For full technical documentation, see Appendix C.